

Amendment to the Claims

This listing of claims will replace all prior versions and listings of claims in the above-referenced application.

1. (currently amended) A transgenic mouse ~~non-human mammal~~ whose genome is heterozygous for a mutation engineered into the Erk5 gene, wherein in a homozygous state said mutation results in a functionally deficient Erk5 gene and embryonic death characterized by a lack of vasculogenesis and angiogenesis ~~in said homozygous embryo~~.
2. (currently amended) A cell isolated from the transgenic mouse ~~non-human mammal~~ according to claim 1, wherein said cell is isolated from said mouse ~~mammal~~ at the embryonic stage or at the post partum stage.
3. (currently amended) A transgenic mouse ~~non-human mammalian~~ embryo whose genome is homozygous for a mutation engineered into the Erk5 gene, wherein said mutation results in a functionally deficient Erk5 gene and embryonic death characterized by a lack of vasculogenesis and angiogenesis in said homozygous embryo.
4. (currently amended) A cell isolated from the transgenic mouse ~~non-human mammal~~ according to claim 3.
5. (currently amended) An isolated mouse cell heterozygous for a mutation engineered into the Erk5 gene, wherein said mutation results in a functionally deficient Erk5 gene, wherein said cell is produced by introducing a mutated Erk5 gene into a mouse cell containing a functional Erk5 gene.
6. (currently amended) A chimeric mouse ~~non-human mammal~~ which comprises cells that are heterozygous for a mutation engineered into the Erk5 gene, wherein in a homozygous state said mutation results in a functionally deficient Erk5 gene and ~~wherein a mammalian embryo whose genome is homozygous for said mutation is characterized by a lack of vasculogenesis and angiogenesis and a failure to survive to birth.~~
7. (currently amended) A cell isolated from the chimeric mouse ~~non-human mammal~~ according to claim 6, wherein said cell is heterozygous for a defect engineered into the Erk5 gene.

8 - 11. (canceled)

12. (currently amended) The isolated mouse cell according to claim 5 ~~44~~, wherein said cell is an embryonic stem cell.

13-21. (canceled).